

# STRATEGIES TO SOLVE UNFINISHED LEARNING

Targeted Intensive Tutoring

Expanded Learning Time

The Importance of Strong Relationships



## ACKNOWLEDGEMENTS:

These materials are the result of a collaborative effort between The Education Trust and MDRC staff, including Kayla Patrick, senior P-12 policy analyst (Ed Trust), and Alison Socol, Ph.D., assistant director of P-12 Policy (Ed Trust), Jean B. Grossman, Ph.D., Senior Fellow (MDRC), and Miki Bairstow Shih, technical research analyst (MDRC).

# Strategies to Solve UNFINISHED LEARNING

WHEN THE PANDEMIC FORCED SCHOOLS ACROSS THE COUNTRY TO CLOSE THEIR DOORS IN MARCH 2020, many district and school leaders worked quickly to plan for and address students' "unfinished learning."<sup>1</sup> How would they support students who had been exposed to content, but had not yet had a chance to master it? A [recent study](#) indicated that students, on average, could experience up to five to nine months of unfinished learning by the end of June 2021. But it will be sometime before we know the true amount of unfinished learning caused by schools closing their doors.

What is certain, however, is that as the nation continues to battle this pandemic and at-home learning continues, there will be a need to help students, especially the nation's most vulnerable students, complete unfinished learning for weeks, months, and even years to come. The lack of adequate time for districts to prepare for sudden shutdowns as well as the lack of resources for many districts, especially those that are chronically underfunded, to adjust to virtual learning has exacerbated inequities for Black, Latino, and Native students and students from low-income backgrounds.

For example, a [national survey of school leaders](#) revealed that students in high-poverty districts were expected to spend far less time on instructional activities during virtual learning than were their peers in low-poverty districts. More specifically, 24% of leaders in high-poverty districts compared to just 12% in low-poverty districts said that distance learning for elementary school students primarily involved content review rather than teaching new material.

Families, especially in communities with more students from low-income backgrounds, more English learners, and more students of color, also face many obstacles to participating in distance learning opportunities, for reasons ranging from [inadequate access to technology](#) to competing responsibilities such as jobs or childcare [that limit the time available](#) to focus on learning. It is most important to note that these inequities are not limited to the current crisis; they are [longstanding](#).

Moving forward, educators will need to administer high-quality assessments to determine where learning must be accelerated and provide high-quality instruction to ensure students have the opportunity to reach high standards. Students will need access to opportunities, supports, and strong and supportive relationships. And targeted actions from school and district leaders and policymakers are required to ensure stretched budgets do not result in policies and practices that harm the students who face the most injustices.

The degree of unfinished learning caused by the pandemic will differ by student, subject, and grade — affecting math more than reading, younger grades more than older, and students already lacking adequate supports more than others. Research supports two ways schools can give students the opportunities and supports they need to complete unfinished learning: **targeted intensive tutoring and expanded learning time**. The Education Trust and MDRC designed the following briefs to help leaders make decisions on how to implement these strategies and where to invest resources, especially in ways that best support the country's most underserved students. We also highlight research-based interventions to **build and maintain strong relationships**: without strong relationships and connections between students and school staff, educators cannot catch students up. Finally, when evidence exists, we highlight the tradeoffs between effectiveness, affordability, and feasibility when implementing a strategy in different ways.

As we navigate these unprecedented times, it will be even more important that investments are made to grow the evidence base and evaluate the effectiveness of programs used to accelerate learning.

1. The Education Trust uses the term "unfinished learning," as opposed to "learning loss" or "learning gaps," to describe material that should have presented to students, but has not yet been mastered. The idea that learning is not complete better reflects the reality that all students can learn and "gaps" can be closed with equitable opportunities, materials, assessments, and high-quality instruction. With this phrasing, our goal is to redirect any focus on "fixing students" toward a focus on systemic changes to meet the needs of students.

# Expanded LEARNING TIME

AS THE NATION CONTINUES TO BATTLE THE COVID-19 PANDEMIC and at-home learning continues, there will be a need to help students, especially the nation's most vulnerable students, complete unfinished learning for weeks, months, and even years to come. Research shows expanded learning time (ELT) is one approach to helping historically underserved students catch up to meet high standards. ELT encompasses programs or strategies implemented to increase the amount of instruction and learning students experience. ELT strategies include after-school, summer, and in-school programs.

District leaders considering ELT should follow the research and invest in evidence-based methods to support students to get back on track, **while also fostering trusting relationships and providing an opportunity for a well-rounded education**. Additional time can be beneficial to students, but only if that time is spent in ways that maximize teaching and learning. Overall, leaders will need to ensure that *all* school time is used especially well after months of unfinished instruction. ELT can only be effective if time during the school day is also used to efficiently and effectively accelerate learning.

In this brief, we focus on ELT programs that significantly increase the amount of new math and/or English language arts instruction delivered to students.

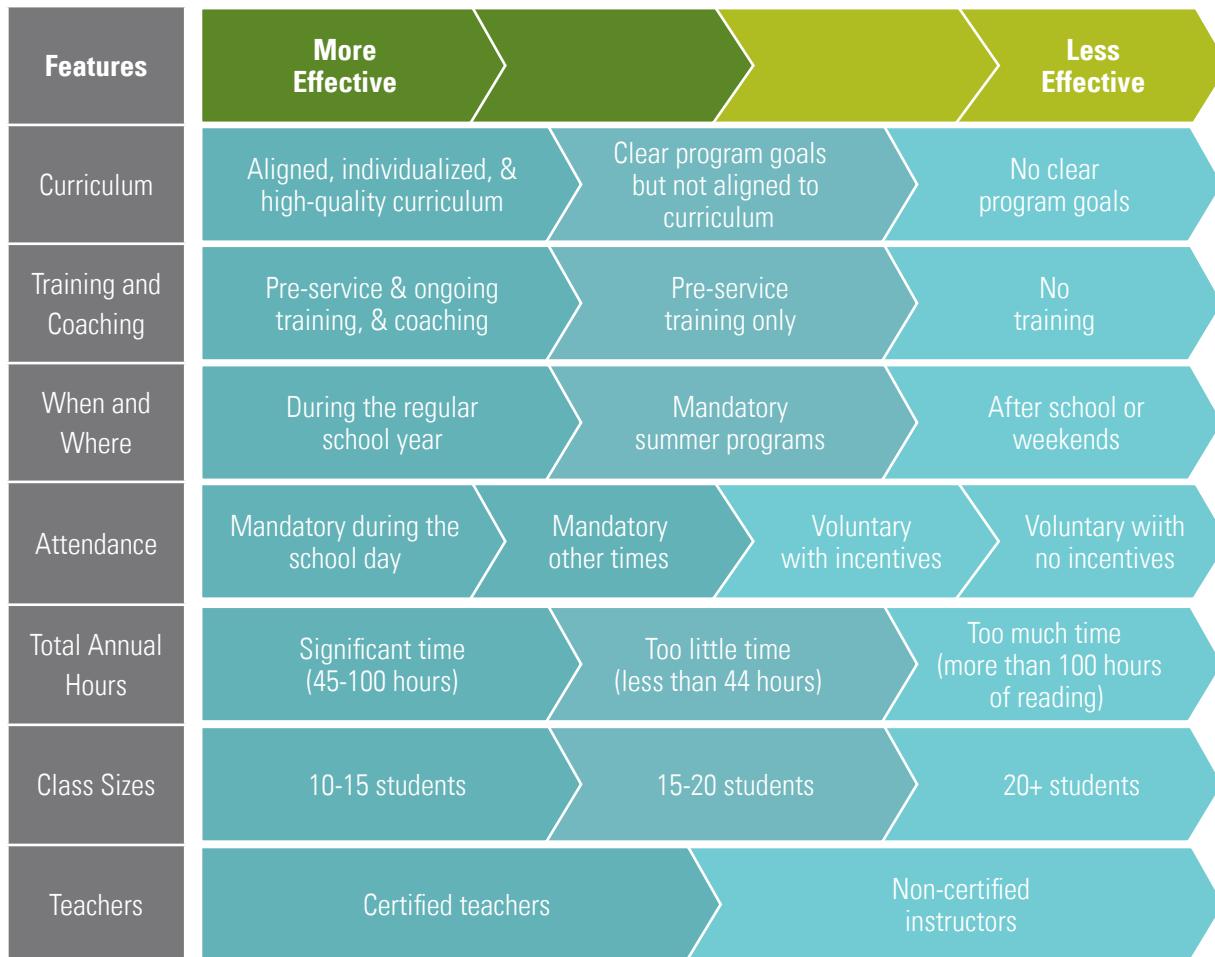
## WHAT DO WE KNOW ABOUT WHAT WORKS?

District and school leaders considering different ways to accelerate learning will have to make a number of challenging decisions to meet the needs of students experiencing unfinished learning. District leaders will need to make important policy decisions; school leaders will need to make decisions around staffing, partnering with community organizations or providers, scheduling, and curriculum. With each of these decisions, district and school leaders will have to balance what the evidence says is most effective with what is most feasible given their resource constraints and local context.



## HOW EFFECTIVE IS EXPANDED LEARNING TIME?

We looked at the research to help leaders navigate these complicated decisions. The chart below shows how implementing different features of expanded learning impacts its effectiveness.



## CRITICAL QUESTIONS FOR LEADERS:

### *Which students benefit most?*

Research shows that increasing the number of hours of instruction students receive during the school day (either during nonacademic class periods or by extending the official school day) can be effective for all age groups, types of students, and subject matter.<sup>1</sup>

### **How many students should be placed with an instructor during ELT?**

Smaller classes are better for extended learning time. They give teachers the opportunity to provide individualized instruction, which can be particularly helpful for students experiencing unfinished learning. Research also shows:

- More effective extended learning programs break up students **into groups of 10-20**.<sup>2</sup>
- Classes with **over 20 students are less effective**.<sup>3</sup>

## What kind of training and support should schools provide for ELT instructors?

The most effective ELT programs provide *all* instructors with pre-service training, on-going training, and 1-to-1 coaching. Research also shows:

- For certified teachers, **pre-service and ongoing training should focus on how to implement the program's curriculum, including guidance on differentiating lessons** for students experiencing different levels of unfinished learning. The program's behavior management system should also be explained.<sup>4</sup>
- Non-certified instructors **should receive extra training in pedagogy and classroom management**, in addition to curriculum and differentiation.<sup>5</sup>
- **All instructors can benefit from 1:1 coaching**, but it is critical for less experienced instructors.<sup>6</sup>
- Effective coaches typically **observe classrooms about once a week and provide instructors feedback and curricular support**.<sup>7</sup>

## How should schools extend learning time?

*Extra instruction can take place after school, during breaks, or during the summer. Instruction during any of these periods can be effective if the instruction is carried out by certified teachers and if the curriculum is both individualized and aligned with the content in the regular school day. Scheduling decisions should be made equitably to ensure students and families who already face the most injustices do not face additional barriers.*

- Schools can offer extra instruction at **many different times during the day and year**. Many schools, for example, double reading and math periods during the school day, either by eliminating classes or by extending the school day for all students by one or two hours.
- The most effective ELT strategies — those that have improved student outcomes to an equivalent of four to eight extra regular months of school — use the following strategies:
  - **Double blocking**: students get an extra period a day in a specific subject<sup>8</sup>
  - **Acceleration camps**: students participate in full days of instruction and practice<sup>9</sup>
  - **Mandatory summer school programs**: students are required to attend in order to be promoted to the next grade-level<sup>10</sup>
- A benefit to all three of these formats is that **classroom teachers can provide additional instruction either during the school day, after school, or during a break** when teachers, depending on the local union contract, are available for hire, as is the case with the holiday or summer programs.
- The **double block and acceleration camps can be beneficial because they can easily align** with students' regular coursework being taught during the calendar year.<sup>11</sup>
- In after-school settings, **high-quality ELT programs have been shown to increase average student test scores by 12 percentile points**.<sup>12</sup>

## **How much additional learning time should students receive?**

*Research indicates programs that offer 44 to 100 hours of additional instruction have an impact on student learning. Programs that provide more or less extended learning time are less effective in some cases; however, the effectiveness depends on the subject area.*

- For math, the evidence suggests that providing less than 43 hours of extra learning time annually has only a small impact, while offering 44 to 100 hours has a more substantive effect. Offering more than 100 hours can be effective, but research shows it is somewhat less so.<sup>13</sup>
- For reading, the evidence suggests that offering less than 43 hours or between 85 and 210 hours of extra instruction is effective, but almost half as much as offering 44 to 84 hours.<sup>14</sup>
- The most effective number of hours for summer school instruction is in the 70 to 130 hour range.<sup>15</sup>
- Finally, instruction delivered when students are less likely to engage with the material, such as additional days at the end of the school year when they are yearning for a summer break, does not improve outcomes.<sup>16</sup>

## **What curricula should schools follow during ELT?**

*The most effective ELT curricula has content that is aligned with content from the regular school day, and lesson plans that include options for individualized instruction, allowing teachers to tailor instruction to both struggling and high-achieving students.*

- An easy-to-use curriculum is even more essential if ELT instructors are non-certified teachers.<sup>17</sup>
- The most effective programs use high-quality, engaging, commercially available, standard-aligned curricula, supplemented with district-developed lessons and activities.<sup>18</sup> While certified teachers have the skills, they often do not have the time or clear understanding of the program goals to develop timely and effective lesson plans.<sup>19</sup>

## **What is the most effective way to ensure students attend ELT?**

*Unsurprisingly, ELT's effectiveness is directly tied to student attendance. Schools can expect the highest rates of attendance if instruction is provided during the school day, since the extra instruction is part of the regular school schedule. Research shows:*

- Strong relationships with students and ELT staff are the most important element of attendance. The more students feel encouraged and supported by adults, the more students enjoy ELT and want to attend.<sup>20</sup>
- If schools are implementing an after-school, summer, or accelerated academy, schools need to have **policies in place to encourage high levels of attendance.**<sup>21</sup>
- Policies that highly incentivize students (and their families) to attend, such as mandatory programs, are most effective. The best voluntary programs have an attendance policy that is clear to both students and parents, track attendance daily, and provide incentives for good attendance.<sup>22</sup>

## How should schools staff ELT?

*Students have greater increases in learning in ELT classrooms staffed by certified teachers because of these teachers' classroom experience, knowledge of the school day curriculum, and familiarity with state standards.<sup>23</sup> Research also shows:*

- Even with training, non-certified teachers are more likely to have **classroom management difficulties and often do not improve learning outcomes for students.**<sup>24</sup>
- If schools are experiencing staffing challenges, school leaders can improve the effectiveness of non-certified teachers by **providing a curriculum that is easy to use and that is aligned to the rest of the school day, 1:1 coaching, as well as pre-service and ongoing training that covers pedagogy and classroom management.**<sup>25</sup>

### A CAUTIONARY TALE

Not all programs during the school day have shown large increases in student outcomes. Implementation decisions matter, and it is imperative that programs **center equity and high-quality instruction** in those decisions. For example, in 2012, Florida passed legislation that required double dose reading in the lowest performing elementary schools. The legislation required these schools to add one additional hour to each school day and use the additional hour for reading instruction. A study of the extra hour of reading on third through sixth graders found the average student learned only 10% more than they normally would (the equivalent to an extra month of regular school) and no effect was found for students in the lowest reading level.<sup>26</sup> The relatively small increase in outcomes is because many schools were unable to place students with their certified teachers or with small groups. More specifically, only 29% of schools evaluated in this study exclusively used students' regular teachers to provide the extra instruction and only 28% of schools delivered the extra learning time in small groups exclusively.

### *Scheduling for Equity:*

Students of color and students from low-income backgrounds, who, even before the pandemic, had the least access to enrichment programs and quality educational opportunities, should not miss any more of these opportunities. In fact, schools should be creating more opportunities for these students instead of taking them away. While scheduling may be challenging, it is important to ensure students are not made to feel penalized or stigmatized by taking away their breaks, electives, or other periods known to improve engagement among students. It is also important that each student is set up for success and has the opportunity to engage in curriculum and activities that they can be immediately successful in. To do that, school leaders will need to implement equitable scheduling. This is especially important during and after pandemic-related school closures where many students have found it difficult to stay engaged.

## QUESTIONS:

- Have you identified an after-school provider or community partner that includes as many effective features (as described above) as possible?
- Is your leadership team using diagnostics to identify which students could benefit from what type of expanded learning opportunities and scheduling accordingly?
  - Are students assessed regularly throughout the year to monitor progress?
- Has your school created a plan to reduce stigma associated with ELT opportunities?
  - Does your schedule ensure that the school is not practicing racialized tracking? Classes should be as racially diverse as the entire school.
  - Do students who are ready for advanced courses have the opportunity to take them (i.e., are English learners, who have missed months of English instruction, still given the opportunity to enroll in gifted and talented courses?)
  - Are students grouped with their peers? (i.e., do all eighth graders take PE together?)
- Do students have adequate opportunities to take enrichment or elective courses?
- Are students given adequate time for lunch and breaks?
- Is the ELT curricula culturally responsive?
- Is the ELT program structured so that students do not feel penalized or stigmatized for having additional instructional time?

## PROMISING PRACTICES

### *Reading or Math Instruction After School<sup>27</sup>*

Students in second through fifth grade who experienced unfinished learning in reading or math were offered a high-quality, fun reading or math curriculum in 27 after-school centers across 10 states. The curriculum used was designed for the after-school environment during the first 45-minute period of their elementary school's after-school program, instead of homework help. Students participated in after-school enrichment or recreation activities for two other periods. Program staff encouraged attendance by communicating with parents when students were absent, and providing incentives, such as weekly prizes. This program generated **a two- to three-month gain in math** in the first year, although no gains in reading. Although the curriculum was not aligned with the school's traditional curriculum the program had several features aligned with best practice:

- Students in groups of 10 or less were grouped with a certified teacher
- Teachers received initial and on-going training and 1:1 coaching
- Students received 45 minutes of instruction, four days a week, during the school year.

### *Ninth Grade Success Academy in Talent Development<sup>28</sup>*

The Talent Development High School model aims to improve the academic achievement of students in large, nonselective, comprehensive high schools. In this model:

- Certified teachers use a specialized curriculum designed for 90-minute class periods
- Students have double blocks of core subjects such as math and ELA
- Small “learning communities” are created among students in the same grade, by placing their classes in a single wing
- Teachers receive initial training, on-going training throughout the school year, and 1:1 coaching.

The double blocking results in an additional 30 minutes of math and ELA each school day. The program costs \$250-\$350 per student per year. The program has made promising gains – by the end of ninth grade, this program increased the percentage of students earning at least one math credit by 11.6, earning at least one algebra course by 24.5, and the percentage earning at least one ELA credit by 8.6.

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